

Title (en)

Amplifier arrangement.

Title (de)

Verstärkeranordnung.

Title (fr)

Montage amplificateur.

Publication

EP 0199381 A1 19861029 (EN)

Application

EP 86200398 A 19860312

Priority

NL 8500770 A 19850318

Abstract (en)

A high-efficiency class-G type amplifier comprises a first transistor ($T_{1</sub>}$), whose collector is connected to a first supply voltage (V_1) via a first diode ($D_{1</sub>}$) and a second transistor ($T_{2</sub>}$), which is connected in series with said first transistor and which has its collector connected to a second supply voltage ($V_{2</sub>}$). The series arrangement of a second ($D_{2</sub>}$), a third ($D_{3</sub>}$) and a fourth diode ($D_{4</sub>}$) is arranged between the bases of the first and the second transistor ($T_{1</sub>}$, $T_{2</sub>}$), the fourth diode ($D_{4</sub>}$) being poled in a direction opposite to that of the second ($D_{2</sub>}$) and the third diode ($D_{3</sub>}$). By means of the series arrangement of a first resistor (R_1) and the emitter-collector path of a first current-source transistor ($T_{4</sub>}$) the second supply voltage ($V_{2</sub>}$) is connected to the anode (4) of the fourth diode ($D_{4</sub>}$). The junction point (5) between the first resistor (R_1) and the current-source transistor ($T_{4</sub>}$) is connected to the output (2) of the arrangement by means of a capacitor ($C_{1</sub>}$). By means of such an arrangement the output (2) can be driven to a voltage substantially equal to the second voltage ($V_{2</sub>}$).

IPC 1-7

H03F 1/02; H03F 3/50

IPC 8 full level

H03F 3/30 (2006.01); **H03F 1/02** (2006.01); **H03F 3/20** (2006.01); **H03G 3/30** (2006.01)

CPC (source: EP KR US)

H03F 1/0233 (2013.01 - EP US); **H03F 1/0244** (2013.01 - EP US); **H03F 3/26** (2013.01 - KR)

Citation (search report)

- [AD] US 4001707 A 19770104 - IGUCHI SHINSUKE
- [A] US 3488551 A 19700106 - BRYDEN JOSEPH E
- [A] NTZ NACHRICHTEN TECHNISCHE, vol. 33, no. 9, September 1980, page 602-607, Berlin, DE; B. RALL et al.: "Bildfernspreechkoppelfeld mit integrierten Halbleiterkoppelpunkten"
- [A] PATENTS ABSTRACTS OF JAPAN, vol. 4, no. 18, 13th February 1980, page 22 E 171; & JP - A - 54 157 459 (HITACHI SEISAKUSHO K.K.) 12-12-1979

Cited by

EP1024591A1; US6204730B1

Designated contracting state (EPC)

BE DE FR GB IT

DOCDB simple family (publication)

EP 0199381 A1 19861029; EP 0199381 B1 19891129; CA 1236891 A 19880517; DE 3667230 D1 19900104; HK 88691 A 19911115; JP H0580164 B2 19931108; JP S61214808 A 19860924; KR 860007778 A 19861017; KR 940011386 B1 19941207; NL 8500770 A 19861016; SG 87190 G 19901221; US 4706035 A 19871110

DOCDB simple family (application)

EP 86200398 A 19860312; CA 504181 A 19860314; DE 3667230 T 19860312; HK 88691 A 19911107; JP 5610886 A 19860315; KR 860001906 A 19860315; NL 8500770 A 19850318; SG 87190 A 19901025; US 83872886 A 19860311